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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
|-----------------|-------------|----------------------|---------------------|------------------|

09/586,381                      06/02/2000                      David E. Green                      2130                      7037

25280                      7590                      03/02/2007  
MILLIKEN & COMPANY  
PO BOX 1926  
SPARTANBURG, SC 29303

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| EXAMINER |
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BHAT, NINA NMN

| ART UNIT | PAPER NUMBER |
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1764

| SHORTENED STATUTORY PERIOD OF RESPONSE | MAIL DATE | DELIVERY MODE |
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3 MONTHS                      03/02/2007                      PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

|                                      |                                     |  |
|--------------------------------------|-------------------------------------|--|
| <b>Application No.</b><br>09/586,381 | <b>Applicant(s)</b><br>GREEN ET AL. |  |
| <b>Examiner</b><br>N. Bhat           | <b>Art Unit</b><br>1764             |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1)  Responsive to communication(s) filed on 05 December 2006.
- 2a)  This action is **FINAL**.
- 2b)  This action is non-final.
- 3)  Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4)  Claim(s) 49-59 is/are pending in the application.  
4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5)  Claim(s) \_\_\_\_\_ is/are allowed.
- 6)  Claim(s) 49-59 is/are rejected.
- 7)  Claim(s) \_\_\_\_\_ is/are objected to.
- 8)  Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9)  The specification is objected to by the Examiner.
- 10)  The drawing(s) filed on \_\_\_\_\_ is/are: a)  accepted or b)  objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11)  The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12)  Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a)  All    b)  Some \*    c)  None of:  
1.  Certified copies of the priority documents have been received.  
2.  Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3.  Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1)  Notice of References Cited (PTO-892)
- 2)  Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3)  Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4)  Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5)  Notice of Informal Patent Application
- 6)  Other: \_\_\_\_\_

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**DETAILED ACTION**

1. Applicant's amendments of December 5, 2006 have been fully and carefully considered. The examiner acknowledges cancellation of claims 29-48 in favor of new claims 49-59. The examiner has reviewed the entire prosecution history of this case and has fully considered applicant's July 7, 2006 response. Accordingly, applicant's arguments are persuasive regarding the rejections over the various combinations over Yokozeki et al., Ghosh and Sawan et al. the rejections over these references are withdrawn. Upon updating the search, the examiner has found many patents as well as pending cases where Milliken is the assignee and/or there is one or more common inventor. It has been deemed necessary by the instant examiner that obvious type double patenting rejections are appropriate. New grounds of rejection follows:

2. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

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3. Claims 49-59 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-8 of U.S. Patent No. 6,821,936. Although the conflicting claims are not identical, they are not patentably distinct from each other because both applications claim a wash durable antimicrobial treated substrate which includes an antimicrobial silver finish, at least one binder, a substrate selected from the group consisting of a yarn, a fabric comprised of individual fibers and a film, and wherein the substrate includes the finish after the substrate is washed using the AATCC Test Method 130-1982. However, in the '936 patent, applicant specifically teaches the type of antimicrobial activity and specifically discloses the type of binder on the substrate. In the instant case, the claims are broader and the binder is generic but it would have been obvious to one having ordinary skill in the art if not obvious that if the same type of antimicrobial silver finish is disposed on the substrate and that the same type of wash cycle is used on the substrate there would have been a reasonable expectation by the ordinary artisan that the treated substrate would exhibit the Klebsiella pneumonia and Staphylococcus aureus log kill rates as claimed in the '936 and that the treated substrate is inherently met by the substrate taught in the '936 patent or obviously be met by the treated substrate.

4. Claims 49-59 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 2-3 and 6 of U.S. Patent No. 6641829. Although the conflicting claims are not identical, they are not patentably distinct from each other because both applications claim a wash durable antimicrobial treated substrate, specifically in the '829 patent the substrate would read on a carpeted

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flow article, which includes an antimicrobial silver finish, at least one binder, a substrate selected from the group consisting of a yarn, a fabric comprised of individual fibers and a film, and wherein the substrate includes the finish after the substrate is washed using the AATCC Test Method 130-1982. However, in the '829 patent, applicant specifically teaches the type of substrate being a carpet, the type of antimicrobial activity and specifically discloses co-additive which can be a fluorochemical and at least one binding agent. In the instant case, the claims are broader and the binder is generic but it would have been obvious to one having ordinary skill in the art if not obvious that if the same type of antimicrobial silver finish is disposed on the substrate and that the same type of wash cycle is used on the substrate there would have been a reasonable expectation by the ordinary artisan that the treated substrate would exhibit the Klebsiella pneumonia and Staphylococcus aureus log kill rates as claimed in the '829 and that the treated substrate is inherently met by the carpet taught in the '829 patent or obviously be met by the treated substrate. Also to eliminate the fluorochemical additive and its intended function as claimed in the '829 patent where "comprising" language has been used in both would have been obvious to one having ordinary skill in the art at the time the invention was made.

5. Claims 49-59 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims of copending Application No. 09/585,762 (now allowed US Patent Pending). Although the conflicting claims are not identical, they are not patentably distinct from each other because both inventions claim a treated substrate comprising a finish which comprises metal particles,

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metal slats, metal oxides and any combination thereof which would read on applicant silver particle containing compounds of the instant invention, the substrate in the '762 application includes at least one binder material which is selected from the group consisting of melamine formaldehyde resins, acrylic resins, PVC and vinyl copolymers and mixtures thereof the broad recitation of "binder" of the instant application would read on the specific binder taught in the '762 application, the substrate regarding the wash cycle and the retention of the finish such that the substrate after washing retains its antimicrobial activity has been taught in both inventions. To add the binder in an amount which is not claimed in the '762 application but in the '381 would have been obvious to one having ordinary skill in the art because to add the binder in an amount which would provide best results so that the finished adheres to the substrate even after a number of wash cycles would have been obvious to one having ordinary skill in the art at the time the invention was made.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

6. Claims 49-59 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 7-8 and 10-11 of copending Application No. 10/439,139. Although the conflicting claims are not identical, they are not patentably distinct from each other because in the '139 application applicant claims a yarn or spool of yarn which is more specific than the substrate of the instant invention but as claimed in the instant invention the substrate can be a "yarn", the yarn is then a textile as claimed in the '139 application, both applications teach the

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same type of wash cycle, the same type of antimicrobial agent being a silver metal particle containing compound and the binder. The difference between the instant invention and that of the '139 application is the steps of impregnating and pumping the dispersion. The treated substrate of the instant invention is more generic and the yarn, substrate or textile article would not be different than that of the instant invention and is rendered obvious because the article is essentially the same but the article is drafted as a product by process and it maintained that the differences in the treated substrate of the instant invention and the yarn and textile as claimed are obvious differences and to include the specific amount of binder providing best results as claimed in the instant invention would have been obvious to one having ordinary skill in the art at the time the invention was made.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

7. With a timely filed and properly executed Terminal Disclaimer, the application would be in condition for allowance because the prior art does not teach and/or substrate having a finish applied to the surface of the substrate which includes metal particles, metal salts, metal oxides and any combination there of and a at least one binder material in an amount of 0.1 to 40 weight percent of the metal or wherein the at least one portion of the treated substrate is covered with a binder formulation; wherein the treated substrate is electrically non-conductive and wherein the finish is durable to stand wash procedures wherein the finish is integrally retained on the portion of the surface substrate after 10 washes performed in accordance with the wash procedure of

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AATCC Test Method 130-1981, so that at least one portion of the treated substrate retains at least about 50% of the adhered finish. The treated substrate including a finish which is durable to multiple laundering cycles and retains and exhibits antimicrobial properties.

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

9. The art made of record and not relied upon is considered pertinent to applicant's disclosure. GB 2 185 998 teaches a plant tissue culturing substrate, which includes a substrate including a metal salt, transition metal oxide, glass fibers and a binder, which includes melamine or styrene binder.



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10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to N. Bhat whose telephone number is 571-272-1397. The examiner can normally be reached on Monday-Friday, 9:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Glenn Caldarola can be reached on 571-272-1444. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



N. Bhat  
Primary Examiner  
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